

7
This Page Is Inserted by IFW Operations
and is not a part of the Official Record

BEST AVAILABLE IMAGES

Defective images within this document are accurate representations of the original documents submitted by the applicant.

Defects in the images may include (but are not limited to):

- BLACK BORDERS
- TEXT CUT OFF AT TOP, BOTTOM OR SIDES
- FADED TEXT
- ILLEGIBLE TEXT
- SKEWED/SLANTED IMAGES
- COLORED PHOTOS
- BLACK OR VERY BLACK AND WHITE DARK PHOTOS
- GRAY SCALE DOCUMENTS

IMAGES ARE BEST AVAILABLE COPY.

As rescanning documents *will not* correct images,
please do not report the images to the
Image Problem Mailbox.

WE CLAIM:

1. A method for forming a plurality of adhesive fastener assemblies, comprising the steps of:

(a) providing a web of substrate material along a longitudinal direction, said substrate web having a major facing surface thereof and having first and second side edge regions thereof;

(b) providing for a component of a primary fastening means disposed across said major surface of said substrate;

(c) attaching a first web of stiffening material to said substrate web at a location which is proximate said first side edge region of said substrate web;

(d) attaching a second web of stiffening material to said substrate web at a location which is proximate said second side edge region of said substrate web; and

(e) separating a medial region of said substrate web along a generally longitudinally extending serpentine line to provide at least first and second fastener tab subassemblies.

2. A method as recited in claim 1, further comprising the step of dividing at least one of said first and second fastener tab subassemblies to provide a plurality of fastening tabs.

3. A method as recited in claim 1, further comprising the steps of:

(f) attaching a first web of side panel material to an outboard side region of said first fastener tab subassembly to form a first composite panel-and-fastener subassembly; and

(g) attaching a second web of side panel material to an outboard side region of said second fastener tab subassembly to form at least a second composite panel-and-fastener subassembly.

4. A method as recited in claim 3, wherein said attaching step (f) is configured to provide a first web of side panel material composed of an elastomeric material which is stretchable along a cross-direction of said first side panel web; and said attaching step

- 5 (g) is configured to provide a second web of side panel material composed of an elastomeric material which is stretchable along a cross-direction of said second side panel web.

5. A method as recited in claim 4, further comprising the step of dividing at least one of said first and second composite subassemblies to provide a plurality of panel-and-fastener components.

6. A method as recited in claim 5, wherein
said step (c) comprises the step of attaching a first web of stiffening material composed of a first web of release material, said first release web having a first securement surface and having a
5 release surface thereof which is located opposite said securement surface, said release surface constructed to releasably adhere to said component of said primary fastening means; and

10 said step (d) comprises the step of attaching a second web of stiffening material composed of a second web of release material, said second release web having a second securement surface and having a second release surface thereof which is located opposite said second securement surface, said second release surface constructed to releasably adhere to said component of said primary fastening means.

7. A method as recited in claim 5, further comprising the step of connecting at least one of said panel-and-fastener assemblies to each of a pair of lateral side regions of a waistband portion of an article.

- 8. A method as recited in claim 7, wherein said separating step (e) is configured to separate said composite along a serpentine line having traversing sections which extend into a portion of each of said release webs.

9. A method as recited in claim 8, wherein said traversing sections of said serpentine line include retroceding portions thereof.

10. A method as recited in claim 1, wherein said providing step (b) includes the step of providing a fastening means which includes a layer of adhesive disposed on said major surface of said web of substrate material.

11. A method as recited in claim 1, wherein said providing step (b) includes the step of having disposed a fastening means comprising a cooperative component of an interlocking mechanical fastener on said major surface of said web of substrate material.

12. A method as recited in claim 11, wherein said disposing step (b) includes the step of having disposed a cooperative hook component of a hook-and-loop type mechanical fastener system on said major surface of said web of substrate material.

13. A method for forming a plurality of stretch panel fasteners, comprising the steps of:

(a) providing a first, substantially continuous web of elastomerically stretchable material extending along a selected, longitudinal machine-direction, said material being elastomerically stretchable at least along a laterally extending cross-direction which is substantially perpendicular to said machine-direction;

(b) providing at least a second, substantially continuous web of elastomerically stretchable material extending along said machine-direction, said material being elastomerically stretchable at least along said cross-direction;

(c) spacing said second web of stretchable material from said first web of stretchable material by a selected distance along said cross-direction;

(d) providing a substantially continuous web of substrate material along said machine-direction at a location which is between said first and second webs of stretchable material, said substrate web having laterally opposed, longitudinally extending side edge regions thereof;

(e) attaching a longitudinally extending lateral side edge region of said first web of stretchable material to said first, side edge region of said substrate web to provide a first bonded region;

25 (f) attaching a longitudinally extending lateral side edge region of said second web of stretchable material to said second, side edge region of said substrate web to provide a second bonded region;

30 (g) laying a first longitudinally extending web of stiffening material at a position proximate said first bonded region, and connecting said first stiffening web to at least said first web of stretchable material;

(h) laying a second longitudinally extending web of stiffening material at a position proximate said second bonded region, and connecting said second stiffening web to at least said second web of stretchable material;

35 (i) separating said substrate web along a longitudinally extending medial region thereof with a substantially regularly undulating serpentine separation line to provide an opposed pair of composite subassemblies;

40 (j) dividing at least one subassembly along a plurality of division lines which extend substantially laterally across said subassembly to provide a plurality of combined panel-and-fastener components.

14. A method as recited in claim 13, wherein said separating step (e) includes the step of separating said substrate web along said longitudinally extending medial region with a substantially regularly undulating serpentine line having
5 alternating, longitudinally retroceding portions thereof.

15. A method as recited in claim 14, wherein said dividing step (j) includes the step of dividing at least one subassembly along a plurality of division lines which extend substantially laterally across said subassembly to provide a plurality of longitudinally
5 paired, combined panel-and-fastener components.

16. A method as recited in claim 15, further comprising the steps of:

(k) of securing at least one of said longitudinally paired panel-and-fastener components to each of two laterally opposed end

5 regions of an appointed waistband section of an article web to provide composite article web; and

(1) severing said composite article web along a cross-direction thereof at a location which divides each of said longitudinally paired panel-and-fastener components into two
10 individual panel-and-fastener components.

17. A method as recited in claim 13, wherein

said laying step (g) includes the step of overlapping said first longitudinally extending web of stiffening material over said first bonded region, and connecting said first stiffening web to said
5 first web of stretchable material and to said substrate web; and

said laying step (h) includes the step of overlapping said second longitudinally extending web of stiffening material over said second bonded region, and connecting said second stiffening web to said second web of stretchable material and to said substrate web.

18. A method as recited in claim 17, wherein said dividing step (j) includes the step of dividing at least one subassembly along a plurality of division lines which extend substantially laterally across said subassembly to provide a plurality of longitudinally
5 paired, combined panel-and-fastener components.

19. A method as recited in claim 18, further comprising the steps of:

(k) of securing at least one of said longitudinally paired panel-and-fastener components to each of two opposed end regions of
5 an appointed waistband section of an article web to provide a composite article web; and

(1) severing said composite article web along a cross-direction thereof at a location which divides each of said longitudinally paired panel-and-fastener components into two
10 individual panel-and-fastener components.

20. A method for forming a plurality of stretch panel fasteners, comprising the steps of:

40 provide an opposed pair of composite subassemblies;

(k) dividing at least one subassembly along a plurality of division lines which extend substantially laterally across said subassembly to provide a plurality of combined panel-and-fastener components;

45 (l) securing at least one of said panel-and-fastener components to each of two laterally opposed end regions of an appointed waistband section of an article web to provide composite article web;

(m) inwardly folding said first and second webs of elastomerically stretchable material to anchor said release tape
50 material onto a selected surface of said article web.

21. A method as recited in claim 20, wherein said separating step (j) includes the step of separating said substrate web along said longitudinally extending medial region with a substantially regularly undulating serpentine line having
5 alternating, longitudinally retroceding portions thereof.

22. A method as recited in claim 21, wherein said dividing step (k) includes the step of dividing at least one subassembly along a plurality of division lines which extend substantially laterally across said subassembly to provide a
5 plurality of longitudinally paired, combined panel-and-fastener components,

said securing step (l) includes the step of securing at least one of said longitudinally paired panel-and-fastener components to each of two, laterally opposed end regions of said waistband section of said article web to provide said composite article web;
10 and

further comprising the step of severing said composite article web along a cross-direction thereof at a location which divides each of said longitudinally paired panel-and-fastener
15 components into two individual panel-and-fastener components.